IN THE CLAIMS:

Please amend claim 4 as follows.

Please add new claims 5 and 6 as follows.

- 1. (Original) A method of producing a bone substitute material predominantly composed of carbonate apatite for medical use, which comprises the step of forming carbonate apatite by contacting a block of calcium compound with a phosphate-containing solution, wherein said calcium compound block contains substantially no powders, wherein at least one of said calcium compound block and said phosphate solution contains a carbonate group, and wherein the method does not include any sintering step.
- 2. (Original) The method of producing a bone substitute material for medical use as claimed by claim 1, wherein the block of calcium compound is one prepared using an artificially synthesized calcium compound.
- 3. (Original) The method of producing a bone substitute material for medical use as claimed by claim 2, wherein the calcium compound block prepared using an artificially synthesized calcium compound is a foamed calcium compound.
- 4. (Currently Amended) A bone substitute material produced by any one of the methods as claimed claims 1 through 3 the method as claimed in claim 1, wherein the material is predominantly composed of carbonate apatite with carbonate group content of 0.5% or more by weight.
- 5. (New) A bone substitute material produced by the method as claimed in claim 2, wherein the material is predominantly composed of carbonate apatite with carbonate group content of 0.5% or more by weight.
- 6. (New) A bone substitute material produced by the method as claimed in claim 3, wherein the material is predominantly composed of carbonate apatite with carbonate group content of 0.5% or more by weight.